

PERPENDICULAR PRACTICE

1) Write the negative reciprocal for each of the following

- a. $-\frac{4}{1}$ *flip numbers* $\frac{1}{4}$
change sign
- b. $\frac{7}{1}$ _____
- c. $\frac{3}{4}$ _____
- d. $-\frac{5}{3}$ _____

2) Write an equation of a line perpendicular to

$$32 = -4x + 8y$$

$$8y = 4x + 32$$

$$y = \frac{1}{2}x + 4$$

3) Write an equation in slope – intercept form of a line passing through the point

$(-2, -4)$ and **perpendicular** to $y = -\frac{2}{7}x + 2$.

4) Determine which of the following equations are parallel or perpendicular to one another. Clearly label your answers and provide solid reasoning for your choice.

- Line A: $3y - 2x = 12$
 Line B: $y = -6x + 44$
 Line C: $3y = 2x - 13$
 Line D: $2y = -3x + 37$

5) Write an equation in slope-intercept form that passes through point $(-8, 2)$ and is perpendicular to the slop of $-1/5$

6) Write an equation in slope – intercept form of the line that passes through $(-1, 2)$ and is **perpendicular** to the line $y = -3x + 4$?